Syllable-building rules

As we have seen, languages show **core similarities** in how they group segments into syllable structure, with only a few specific points of difference.

In our rule-based model of the phonological grammar, we can model this state of affairs with three **universal syllable-building rules**, each of which **applies as generally as possible** but is **limited by language-particular conditions**. For example, our set of *syllabification options* (see "Syllable structure: Overview / Describing syllabification options" handout), to be specified for each language, helps us describe what kind of nucleus, onset, or coda is legal in that language.

The syllable-building rules use a different kind of notation from the feature-change or insertion/deletion rules we have used up to now, because these new rules work by **associating** (linking) one structure to another.

- A **dashed** line means, "Create a new association between..." — this part of the rule diagram therefore represents both the **target** and the **change** of the rule

- A **solid** line shows a mandatory *existing* association between a segment and a syllable (so, this is part of the environment for the rule)

(1)   **Nucleus Rule:** Every unsyllabified segment that is a **legal nucleus** (V'; that is, [+syllabic]) projects (=creates and associates to) a syllable

(2)   **Onset Rule:** Every **unsyllabified** segment (X') that immediately **precedes** a syllabified segment is added to that syllable, as long as a **legal onset** is produced
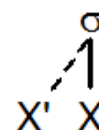
(3)   **Coda Rule:** Every **unsyllabified** segment (X') that immediately **follows** a syllabfied segment is added to that syllable, as long as a **legal coda** is produced
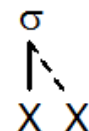
The syllable-building rules must apply in the **order** given. Can you see why this is?

We have also observed that syllabification rules are **persistent** — they reapply immediately, every time segments are added or deleted. This is something else that is different from the segmental phonological rules we have considered previously.